DOE F 1325.8 e Electronic Form Approved by CGIR - 01/20/95(VB)
(8-89)

United States Government **Department of Energy**

Bonneville Power Administration

memorandum

DATE: March 25, 2002

REPLY TO ATTN OF: KEC-4

SUBJECT: Supplement Analysis for the Watershed Management Program EIS (DOE/EIS-0265/SA-77)

TO: Linda Hermeston KEWL
Fish and Wildlife Project Manager

Proposed Action: Methow Valley Fish Screening Project, McKinney Mountain Screen Replacement and Rockview Screen Decommissioning and Replacement with a Well

Project No: 2001-063-00

Watershed Management Techniques or Actions Addressed Under This Supplement Analysis (See App. A of the Watershed Management Program EIS): 1.15 Fish Passage Enhancement-Fishways; 4.20 Well Construction for Primary Water Source; 4.23 Intake and Return Diversion Screens; 4.25 Consolidate/Replace Irrigation Diversion Dams; 9.23 Construction: Erosion and Sediment Control Structures.

Location: Okanogan County, Washington

Proposed by: Bonneville Power Administration (BPA) and the Washington Department of Fish and Wildlife (WDFW), Yakima Screen Shop (YSS)

Description of the Proposed Action: BPA is proposing to fund a project sponsored by the WDFW that would provide immediate and long-term protection for anadromous and resident fish species in the Methow River about 7 to 10 miles northwest of Winthrop. The proposal has two parts: 1) replace an out-of-criteria fishscreening facility on McKinney Mountain irrigation canal with a modern design, and 2) decommission the fish screen on the Rockview irrigation canal and replace it with a well.

Originally, the project included fish screen replacements at the Kumn Holloway and Foghorn sites. The Kumn Holloway project has found other funding, no longer involving BPA. And, the Foghorn screen replacement has been categorically excluded from further NEPA documentation by the lead agency, the USFWS, by memo of 9/17/2001. BPA adopted the USFWS analysis and issued a similar categorical exclusion memo for Foghorn screen replacement on 12/12/2001.

Analysis: The SEPA environmental compliance checklists and Determinations of Nonsignificance for both parts of this project were completed by the WDFW. The original BPA NEPA checklist covering the original screening projects was completed and signed by Eric Egbers, Fish Screening Program Manager for WDFW YSS as grantee, assisted by Shannon Stewart of BPA. Mickey Carter of BPA revised that NEPA checklist as the project changed to entail only McKinney Mountain and Rockview, and as more environmental work concluded.

As it is now, this project meets the standards and guidelines for the BPA Watershed Management Program Environmental Impact Statement (EIS) and Record of Decision (ROD).

The proposed activities would primarily occur in and along canals and diversions connected to the Methow River. The Methow River contains bull trout and Upper Columbia River spring Chinook salmon and steelhead - all Endangered Species Act (ESA) listed species. Potentially suitable habitat for other ESA animals is nearby but does not involve the project sites. No suitable habitat for ESA listed plant species is associated with any of the project sites.

Biological assessments of effects to ESA listed species were provided to USFWS and NMFS in winter 2001-2002. Both agencies concurred without objections or stipulations to findings of "may affect but not likely to adversely affect" species and potentially suitable habitat under their jurisdictions.

The fish screen at McKinney Mountain was constructed in 1953, and is considered not eligible for inclusion in the National Register of Historic Places because it is a more recent version of the rolling-drum type fish screen. It sits in a canal, crossing agricultural land that has been roaded, irrigated and farmed/plowed for several decades. The ground around the fish screen site is covered by large amounts of material dredged from the bottom of the canal over time. No archeological or historic cultural resources were recorded during the intensive field survey conducted by Archeological and Historic Resources (AHS) around the screen site, or through the background literature review. No Traditional Cultural Properties were identified through the site file search. So, no impacts to cultural resources are expected at this site. A letter requesting concurrence with this finding was sent to the Washington State Office of Archeology and the Confederated Tribes of the Colville in March, 2002, along with the detailed report written by AHS.

The Rockview well would be located on agricultural land owned by the WDFW, the proponent of this project. The site is along a native surface, spot-rocked road in a field that has been irrigated, grazed and farmed for several decades, and would continue to be used that way in the future. No historic or prehistoric artifacts were apparent on the ground surface when surveyed by Mickey Carter, BPA, in November 2001. Given present site conditions and the limited impacts associated with drilling a 10-inch well in a farmed field next to a road and existing underground supply line for the lateral wheel line irrigation system, it is very unlikely that any cultural resources would be newly impacted. Decommissioning the Rockview fish screen is also not likely to have any new impact to cultural resources since the screen (built in 1965) and canal would not be removed or obliterated at this time, only taken out of service. However, site surveys by AHS will be performed prior to drilling the well, and if any cultural resources are discovered, the Washington State Office of Archeology and the Confederated Tribes of the Colville would be consulted prior to undertaking any ground disturbing activities.

The McKinney Mountain screen replacement and the Rockview well drilling/screen decommissioning would take place off channel and the associated irrigation ditches would be shut-off or bypassed so that work can occur in the dry. Each project is expected to take only a few days to complete. Given these conditions, these projects would not require state or federal permits to proceed. In the unlikely event that work cannot be accomplished in the dry,

appropriate in-stream work permits would be obtained prior to construction including any required Washington State permit and Corps of Engineers 404 permit.

The landowners involved in the McKinney Mountain screen replacement project and the McKinney Mountain Irrigation District (operators of the diversion and fish screen) are taking part on a voluntary basis, and no water rights would be affected by the fish screen replacement. WDFW has the only proven water right affected by the Rockview diversion and well.

Public comment and involvement of other potential stakeholders occurred through the SEPA and JARPA processes. The project proponents have contacted affected tribes, state and federal fish and wildlife agencies, local governments, and nearby landowners and irrigation companies about the program.

Findings: The project is generally consistent with the Northwest Power Planning Council's Fish and Wildlife Program, as well as BPA's Watershed Management Program EIS (DOE/EIS-0265) and ROD. This Supplement Analysis finds that: 1) implementing the proposed action will not result in any substantial changes to the Watershed Management Program that are relevant to environmental concerns; and 2) there are no significant new circumstances or information relevant to environmental concerns and bearing on the Watershed Management Program or its impacts. Therefore, no further NEPA documentation is required.

/s/ Mickey A. Carter 3-22-2002
Mickey A. Carter
Environmental Protection Specialist

CONCUR:

/s/ Thomas C. McKinney DATE: *3-26-2002*
Thomas C. McKinney
NEPA Compliance Officer

Attachments:
NEPA Compliance Checklist (2)
Washington SHPO Response Letter
USFWS and NMFS Letters of Concurrence (3)

cc: (w/o attachments)
Eric Egbers, Washington Department of Fish and Wildlife, Yakima Screen Shop
Jim Mountjoy, Washington Department of Fish and Wildlife, Big Valley Unit, Winthrop, WA

United States Department of the Interior

FISH AND WILDLIFE SERVICE
Ecological Services
***P. 0. Box* 848**
***Ephrata, Washington* 98823**
***Phone:* 509-754-8580 *Fax:* 509-754-8575**

December 19, 2001

Nancy Weintraub
Department of Energy
Bonneville Power Administration P .0. Box 3621
Portland, Oregon 97208-3621

RE: McKinney Mountain / Krumn Holloway Fish Screens
DOE Reference: KEC-4
FWS Reference: 02-I-EOO61

Dear Ms. Weintraub:

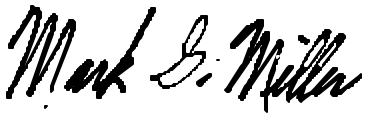
Thank you for your letter of November 29, 2001, which included a Biological Assessment (BA) for the proposed replacement of two fish screens in the Methow River Basin, Okanogan County, Washington. The proposed action includes the removal of the existing fish screens on the Mckinney Mountain and Krumn Holloway irrigation diversions and the installation of new fish screens that meet all current Washingtofi-Departinent offish and Wildlife and National Marine fisheries Service fish protection criteria for all life stages. All work associated with the installation of the new fish screens will be conducted when the irrigation canals are dry and vegetation disturbance at the sites will be minimal.

The Bonneville Power Administration (BP A) has concluded that this project may affect but would not adversely affect gray wolf, grizzly bear, bald eagle, northern spotted owl, or bull trout BP A has also concluded that the proposed project will have no effect on Ute ladies'-tresses. The U. S. Fish and Wildlife Service (Service) concurs with the BP A determination. This concurrence is dependent upon BP A using best management practices when working near open water and wetlands at the project site.

This concludes informal consultation for species under the purview of the Service pursuant to Section 7 of the Endangered Species Act of 1973, as amended (Act). This project should be re-analyzed if new information reveals effects of the action that may affect listed species or critical habitat in a manner or to an extent not considered in this consultation; if the action is subsequently modified in a manner that causes an effect to the listed species or critical habitat that was not considered in this consultation; and/or, if a new species is listed or critical habitat is designated that may be affected by this project.

Your efforts to protect endangered species are appreciated. If you have further questions about this letter or your responsibilities under the Act, please contact Gregg Kurz at (509) 754-8580.

Sincerely,



Supervisor

United States Department of the Interior

FISH AND WILDLIFE SERVICE

Ecological Services
***P. 0. Box* 848**
***Ephrata, Washington* 98823**
***Phone:* 509-754-8580 *Fax:* 509-754-8575**

January 31, 2002

Nancy Weintraub
Department of Energy
Bonneville Power Administration P.O. Box 3621
Portland, Oregon 97208-3621

RE: Rockview Irrigation Diversion Removal
DOE Reference: KEC-4
FWS Reference: 02-I-EOO91

Dear Ms. Weintraub'

Thank you for your letter of January 7, 2002, which included a Biological Assessment (EA) for the proposed replacement of the Rockview irrigation diversion and fish screen in the Methow River Basin, Okanogan County, Washington. The proposed action includes decommissioning of the existing fish screen and irrigation diversion to carry no water from t6he Methow River and replacing this water source with a well located in an agricultural field approximately 1/4 mile from the river. One well approximately 100 feet deep would be drilled to replace the irrigation water source. The well would be located on land owned by the Washington Department offish and Wildlife (WDFW). Decommissioning of the fish screen and diversion will take approximately 1-2 days and will occur in the dry irrigation channel. Drilling of the well is expected to take approximately 2-3 days.

The Bonneville Power Administration (BP A) has concluded that this project may affect but would not adversely'affect gray wolf, grizzly bear, Canada lynx, bald eagle, northern spotted owl, or bull trout. BP A has also concluded that the proposed project will have no effect on Ute ladies'-tresses. The United States Fish and Wildlife Service (Service) concurs with the BPA determination. This concurrence is dependent upon BPA using best management practices when working near open water and wetlands at the project site.

This concludes informal consultation for species under the purview of the Service pursuant to Section 7 of the Endangered Species Act of 1973, as amended (Act). This project should be re-analyzed if new information reveals effects of the action that may affect listed species or critical habitat in a manner or to an extent not considered in this consultation; if the action is subsequently modified in a manner that causes an effect to the listed species or critical habitat that was not considered in this consultation; and/or, if a new species is listed or critical habitat is designated

that may be affected by this project.

Your efforts to protect endangered species are appreciated. If you have further questions about this letter or your responsibilities under the Act, please contact Gregg Kurz at (509) 754-8580.

Sincerely,

Supervisor

UNITED STATES DEPARTMENT OF COMMERCE
National Oceanic and Atmospharic Administration
NATIONAL MARINE FISHERIES SERVICE
Northwest Region
7600 Sand Point Way N.E., Bldg. 1
Seattle, WA 98115

February 11,2002

Nancy H. Weintraub
Bonneville Power Administration
P.O. Box 3621
Portland, Oregon 97208-3621

Re: Endangered Species Act Section 7 Infonnal Consultation and Magnuson-Stevens Fishery Conservation and Management Act Essential Fish Habitat Consultation for the Fish Screen Replacement and Removal on the Methow River (NMFS No. WSB-O2-020).

Dear Ms. Weintraub:

This correspondence is in response to your request for consultation under the Endangered Species Act (ESA). Additionally, this letter serves to meet the requirements for consultation under the Magnuson Stevens Fishery Conservation and Management Act (MSA).

Endangered Species Act , ,

The Bonneville Power Administration (BP A) has requested concurrence with its effect determination that the subject actions "may affect", but are "not likely to adversely affect" Upper Columbia River steelhead *(Oncorhynchus mykiss)* and spring chinook salmon (0. *tshawytscha)* and their designated critical habitat. The NMFS has considered the determination of effects under section 7(a)(2) of the ESA, and its implementing regulations (50 CFR Part 402) and concurs with your determinations.

According to the BA and phone conversations with Eric Egbers of the Washington State Department of Fish and Wildlife (WDFW), WDFW is proposing to replace one fish screen and decommissiQn two others. The McKinneyMountain fish screen, Kumn Holloway fish screen, and Rockview fish screen are located on the Methow River seven to ten miles northwest of Winthrop. The screen replacement would consist of the removal of the old screen and placement of a new portable- screen and fish bypass. The two fish screens to be decommissioned would be restored to natural conditions and replaced by wells.

The BP A is implementing a number of measures to minimize and avoid the effects of the project to fish and their habitat. One of two techniques will be used to prevent listed fish from entering the project area at various water levels. The first technique is a timing restriction that allows actions to occur when river levels prevent wateifrom entering the irrigation canal. The second technique involves construction of a sandbag coffer dam that would prevent water from entering the irrigation canal.

Either method will allow construction to occur in a dry environment that allows completion of the project within three to four days. In addition, any disturbed areas would be covered with "coir fabric" or erosion blankets and re-seeded with a native grass mixture and any native shrubs or small trees that may be up-rooted during the project will be replanted.

Since the proposed action will be completed in a dry irrigation canal with no fish present and the BPA is implementing measures to minimize effects to critical habitat, the NMFS expects any short-term and long-term impacts to be discountable or insignificant.

This concludes informal consultation on these actions in accordance with 50 CFR 402.l2(b)(I). The BPA shall re-analyze the effects of this action if: (I) new information reveals effects of the action may affect listed species in a way not previously considered; (2) the action is modified in a manner that causes an effect to the listed species that was not previously considered; or (3) a new species is listed or critical habitat designated that may be affected by the identified actions.

Magnuson-Stevens Fishery Conservation and Management Act

Federal agencies are required, under §305(b)(2) of the MSA and its implementing regulations (50 CFR 600 Subpart K), to consult with NMFS regarding actions that are authorized, funded, or undertaken by that agency that may adversely affect Essential Fish Habitat (EFH). The MSA (§3) defines EFH as "those waters and substrate necessary to fish for spawning, breeding, feeding, or growth to maturity ." If an action would adversely affect EFH, NMFS is required to provide the Federal action agency with EFH conservation recommendations (MSA §305(b)(4)(A». This consultation is based, in part, on information provided by the Federal actio.n agency and descriptions of EFH for Pacific salmon contained in Appendix A to Amendment 14 to the Pacific Coast Salmon Plan (August 1999) developed by the Pacific Fishery Management Council and approved by the Secretary of Commerce (September 27, 2000).

The proposed action and action area are described in the BA. The project area includes habitats which have been designated as EFH for various life stages of chinook salmon (*O. tshawytscha)* and coho salmon (*O. kisutch).*

Because the habitat requirements (i.e., EFH) for the MSA-managed species in the project area are similar to that of the ESA-listed species, and because the conservation measures that the BPA included as part of the proposed actions to address ESA concerns are also adequate to avoid, minimize, or otherwise offset potential adverse effects to designated EFH, conservation recommendations pursuant to MSA (§JO5(b)(4)(A)) are not necessary. Since NMFS is not providing conservation recommendations at this time, no JO-day response from the BP A is required (MSA §JO5(b)(4)(B)).

This concludes consultation under the MSA. If the proposed action is modified in a manner that may adversely affect EFH, or if new information becomes available that affects the basis for NMFS' EFH conservation recommendations, the HP A will need to reinitiate EFH consultation with NMFS in accordance with NMFS implementing regulations for EFH at 50 CFR 600.920(k).

Thank you for your efforts to protect Upper Columbia River steelhead and chinook salmon. If you have any questions, please contact Justin Yeager of the Washington State Habitat Branch at (509) 925-2618.

Sincerely,

D Robert Lohn
Regional Administrator

cc: Eric Egbers, WDFW

NATIONAL ENVIRONMENTAL POLICY ACT COMPLIANCE CHECKLIST
FOR WATERSHED MANAGEMENT PROJECTS

Bonneville Power Administration
7/17/01 revision

PROJECT NAME: Methow Basin Screening

BPA PROJECT NUMBER: 26015 LOCATION OF PROJECT: Various in Methow River Basin

GRANTEE: Organization: Washington Department of Fish and Wildlife
Primary Contact: Eric B. Egbers
Address: 3705 West Washington Avenue
Yakima, WA 98903-1137
Phone: (509) 575-2733

BRIEF DESCRIPTION OF PROJECT: This project provides fish screen facility upgrades, and new fish screen construction, on four Methow River Basin irrigation diversions; Foghorn, Rockview, McKinney Mountain, Kumn Holloway. In addition, the project scope includes necessary equipment upgrades for efficient project performance.

Within the agency direct appropriation for the 99-01 biennium, funding was appropriated to fabricate and install replacement-screening facilities at the Foghorn, Rockview, McKinney Mountain, and Kumn Holloway irrigation diversions. This funding would not carry over into the current biennium, which began July 1, 2001.
Consequently, funds were needed to finalize the fabrication of these facilities, construct the civil works, and install the screens and bypasses.

The Foghorn fish screen is located approximately 1 mile west of the town of Winthrop, WA. This facility is located on property owned by the U.S. Fish and Wildlife Service (USFWS), Winthrop Hatchery. The facility was originally constructed pre-1951; in-house records dated 1951 indicate maintenance activities. The facility is operated by the Foghorn Irrigation Company and does not meet current National Marine Fisheries Service (NMFS) and Washington Department of Fish and Wildlife (WDFW) criteria for fish protection, including approach velocities, sweeping velocities, screen mesh, screen orientation, and bypass criteria. The WDFW Yakima Screen Shop (YSS) proposes a new electrically driven drum screen with proper orientation relative to flow, and new bypass system. Fabrication of the screen and metal work is scheduled for early summer 2001, with installation scheduled for late fall 2001. All permitting and NEPA requirements for the Foghorn fish screen are being handled by USFWS.

The Rockview fish screen is located approximately 8 miles northwest of the town of Winthrop, WA. This facility is located on recently acquired WDFW property as part of the Big Valley Unit Wildlife Area; this Wildlife Area provides excellent habitat for fish and wildlife. The facility was originally built in 1965 and does not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria. YSS proposes a new paddlewheel driven flat-plate screen with proper orientation relative to flow,

and new bypass system. Fabrication of the screen is scheduled for early summer 2001, with installation tentatively scheduled for early fall 2001.

The McKinney Mountain and Kumn Holloway screens are located approximately 10 miles northwest of the town of Winthrop, WA. These two screening facilities were originally built in 1954 and do not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria. YSS proposes two new paddlewheel driven portable modular drum screens with proper orientation relative to flow, and new bypass systems for the two sites. Fabrication of the portables is scheduled for early summer 2001, with installation tentatively scheduled for early fall 2001.

LIST THE TECHNIQUES OR ACTIONS, BY NUMBER AND TITLE, TO BE ADDRESSED BY THIS PROJECT (See Appendix A of the Watershed Management Program Environmental Impact Statement (EIS) available at *http://www.efw.bpa.gov/cgi-bin/PSA/NEPA/SUMMARIES/WatershedManagement_EIS0265*:

1.15 Fish Passage Enhancement - Fishways

4.23 Intake and Return Diversion Screens

9.23 Construction: Erosion and Sediment Control Structures

The following checklist provides documentation for compliance with the environmental requirements of the National Environmental Policy Act (NEPA) and other environmental laws and regulations. The checklist follows procedures established by the Watershed Management Program Final EIS and its corresponding Record of Decision (ROD) (at *http://www.efw.bpa.gov/cgi-bin/PSA/NEPA/SUMMARIES/WatershedManagement_EIS0265*). BPA staff will use this checklist to prepare the supplemental analysis required by the EIS and ROD.

BPA-funded projects must follow the eight-step planning process found in the ROD. (You may want to use the checklist during your planning process and complete it as you proceed to ensure your project follows the required steps.) Each planning step must be addressed in a Project Management Plan for your project. The Plan's scope and complexity will vary with the project's scope and complexity. The planning process should be interactive and flexible; the steps may occur out of sequence or simultaneously, and the results of one step may require you to re-evaluate earlier steps.

To check a box **on the checklist,** ***double click*** **on it—an options box will appear. Under "Default Value" choose "checked" then click OK.**

Please read the criteria, check them if they apply, and explain or reference how your project meets the criteria, or, explain why they do not apply to your project. Please sign and date the checklist when finished. Do NOT sign it electronically; we must have a hard copy with your signature. If you have questions or need help filling out this checklist, please contact Shannon Stewart, NEPA Watershed Project Coordinator, at 503-230-5928, e-mail scstewart@bpa.gov or Nancy Weintraub at 503-230-5373, e-mail nhweintraub@bpa.gov. BPA can assist you with surveys for cultural resources, threatened and endangered species, and hazardous wastes, although you may have to pay for contractor services, if needed, from your project funds.

EIGHT-STEP PLANNING PROCESS FOR WATERSHED MANAGEMENT PROJECTS

1. DEFINE THE AREA OF CONCERN/INTEREST

In completing this step, the project proponent(s) have considered the following:

☒ **A.** Protection of aquatic systems and other water uses.
If applicable, name agencies you have coordinated with and status:
Okanogan County, WDFW, USFWS, U.S. Army Corps of Engineers (COE), Washington Department of Ecology (WDOE). The SEPA process is complete for Rockview project; the JARPA process has been initiated. The SEPA process has been initiated for the McKinney Mountain and Kumn Holloway projects. The WDFW is coordinating with the USFWS regarding construction activities; an authorizing contract is pending

☒ **B**. The presence or absence of threatened or endangered species, as listed or proposed for listing under the Endangered Species Act (ESA), and their habitat and/or Essential Fish Habitat (EFH) within the vicinity of the project area. The U.S. Fish and Wildlife Service (USFWS) and National Marine Fisheries Services (NMFS) provide this information. Compile a list from the web sites below. Then e-mail, fax, or call the appropriate USFWS/NMFS office for their concurrence with your list. Include the date you retrieved information from the web sites to assure your use of the most current information.
USFWS: http://endangered.fws.gov/index.html
NMFS: http://www.nwr.noaa.gov/esalist.htm

In the Methow River basin, spring chinook and steelhead have been recently listed, in accordance with the Endangered Species Act of 1973 (ESA), as endangered, and bull trout are listed as threatened under the same Act. These four irrigation diversions are located in prime spawning, rearing and/or migration habitat currently used by all three ESA-listed species. Significant losses of juvenile salmon, steelhead, and bull trout are suspected at the existing screen facilities due to excessive approach velocities, over-sized screen mesh openings, and an antiquated fish bypass system. The proposed new facilities will significantly reduce mortality of fry, fingerlings, and smolts, thereby increasing productivity of listed stocks.

The points of diversion for all of the projects are locations that are currently or were historically accessible to chinook salmon; the conveyance channels, which lead to the screen sites, provide rearing habitat for juvenile salmonids. There are no known listed wildlife or plant species in the project areas

Contact made on (date) by (name):

Upper Columbia River Spring Chinook - Federal Register / Vol. 62, No. 159 / Monday, August 18, 1997

Upper Columbia River Steelhead - Federal Register / Vol. 64, No. 56 / Wednesday, March 24, 1999

Columbia River Bull Trout - Federal Register / Vol. 63, No. 111 / Wednesday, June 10, 1998

☐ **C.** The presence of hazardous and toxic wastes (for projects involving land acquisition and/or major ground disturbance).

Present?
Reference:

N/A

2. INVOLVE STAKEHOLDERS

☒ **A.** Consult with affected tribes, state and federal fish and wildlife agencies, cities, local governments, and nearby landowners.

The SEPA process has been initiated on three of the four projects; Rockview (Final DNS received July 24, 2001), McKinney Mountain (DNS received August 10, 2001), and Kumn Holloway (DNS received August 10, 2001). The USFWS is responsible for all permitting on the Foghorn project; it is unknown as to the current status.

☒ **B.** Develop an effective public involvement program. Consider how to inform people about your project and solicit their comments, both early and throughout the planning process. Consider mailings, public notices, public meetings and workshops, Internet postings, radio advertisements, and stories or ads in the local newspaper and in BPA's monthly newsletter.

Describe program, list contacts made and/or methods of contact (i.e. newsletter, public meeting):

Per WAC 197-11-510 Public Notice, when SEPA requires notice to be given, the lead agency must use reasonable methods to inform the public and other agencies that an environmental document is being prepared or is available and that public hearing(s), if any, will be held. The agency may use its existing notice procedures.

Documents which are required to be sent to the WDOE under these SEPA rules will be published in the SEPA register, which will also constitute a form of public notice. However, publication in the SEPA register shall not, in itself, meet compliance with this section.

Per WAC 220-100-095 Public Notice, when required under chapter 197-11 WAC, WDFW will give public notice by one or more of the following methods as appropriate for the specific circumstances:
(a) Notifying public and private groups and agencies with known interest in a certain proposal or in the type of proposals being considered;
(b) Notifying individuals with known interest in a certain proposal or in the type of proposal being considered;
(c) Publication in a newspaper of general circulation in the area in which the proposal will be implemented; and/or
(d) Posting the property.

☒ **C.** Where possible, form partnerships and plan cooperatively with government agencies and others to reduce costs, increase benefits, and/or eliminate duplication.

List partners:

The USFWS is a funding partner on the Foghorn project. The Cooperative Agreement between the USFWS and WDFW stipulates the obligations of each party.

USFWS – fund construction activities, review design and construction plans, and obtain necessary permits and BA's;

WDFW – develop design, fabricate metalwork, perform construction activities, and fund design and fabrication costs.

3. DEVELOP A STATEMENT OF DESIRED FUTURE CONDITION

☒ **A.** Identify a desired future condition for aquatic habitat in the project area, in cooperation with any other watershed activities, that responds to achieving established aquatic habitat objectives (See Step 5) and is self-sustaining (low-maintenance).

State-desired future condition:

Screening projects provide tangible and significant improvements to juvenile fish survival (compared to obsolete screen technology), with both immediate and long-term beneficial impacts. New fish screens comply with current state and federal biological protection criteria to reduce direct mortality, and indirect mortality (caused by stress and injury), to both anadromous and resident salmonids. New fish screens and bypass systems (with a life expectancy of 30-50 years, depending on maintenance) will provide complete protection (virtually 100%) for all salmonid species and life stages. Evaluation studies conducted in the Yakima Basin have shown that survival and guidance rates associated with fish movement through new fish screen facilities range from 95 percent to nearly 100 percent.

☐ **B.** *For projects involving land acquisition,* consider developing sustainable resources (such as timber harvest or crop production) if consistent with established aquatic habitat objectives. These resources could be used to offset initial or long-term maintenance costs.

Describe if applicable:

N/A

4. CHARACTERIZE THE HISTORICAL AND PRESENT SITE CONDITIONS AND TRENDS

☒ **A.** Establish baseline information for aquatic habitat and species against which change can be measured (related to the "measurable aquatic habitat objective" standard included in Step 5).

Reference:

The Foghorn fish screen was originally constructed pre-1951 and does not meet current NMFS and WDFW criteria for fish protection including approach velocities, sweeping velocities, screen mesh, screen orientation, and bypass criteria.

The Rockview fish screen was originally built in 1965 does not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria.

The McKinney Mountain screen and Kumn Holloway screens were originally built in 1954 do not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria.

☒ **B.** Consult with the State Historic Preservation Office (SHPO) and affected tribes to identify potential occurrences of cultural resources.

Bonneville Power Administration (BPA) will conduct cultural resource survey and consultation with SHPO, report to follow

SHPO contacted on (date):
Tribe(s) (list) contacted on (date):

☒ **C.** Develop a plan to survey for threatened or endangered plant and animal species identified by the USFWS and/or NMFS as potentially occurring in the vicinity of the project area, before disturbing land or conducting other activities that may affect such species.

Describe:

Plant surveys to be completed by BPA; a report will follow. A Biological Assessment (BA) will be completed by BPA for threatened or endangered animal species, including fish.l

☒ **D.** Identify and map basic physical conditions such as soil conditions, topography, hydrology, vegetation, and biological information within the vicinity of the project area.

Reference information:

Salmon, Steelhead and Bull Trout Habitat Limiting Factors, Water Resource Inventory Area 48, Final Report, Washington State Conservation Commission, Carmen Andonaegui, July 18, 2000

5. ESTABLISH PROJECT GOALS

☒ **A.** Establish measurable aquatic habitat and physical habitat objectives (e.g., compliance with existing state water quality standards, number of habitat units, list of indicator species).

B. Include these project goals, established by the Council:

☒ Protect and improve a variety of fish habitats, including spawning beds, overwintering and rearing areas, resting pools, and protective cover, especially high-quality native or other habitat for species of special concern (whether present at the project site or not), including endangered, threatened, or sensitive species;

Screening projects provide tangible and significant improvements to juvenile fish survival (compared to obsolete screen technology), with both immediate and long-term beneficial impacts. New fish screens comply with current state and federal biological protection criteria to reduce direct mortality, and indirect mortality (caused by stress and injury), to both anadromous and resident salmonids. New fish screens and bypass systems

(with a life expectancy of 30-50 years, depending on maintenance) will provide complete protection (virtually 100%) for all salmonid species and life stages. Evaluation studies conducted in the Yakima Basin have shown that survival and guidance rates associated with fish movement through new fish screen facilities range from 95 percent to nearly 100 percent.

☐ Develop riparian habitat that could benefit water quality, fish, and wildlife;

☒ Mitigate habitat losses in place, in kind, wherever possible;

☒ Protect and improve natural ecosystems and species diversity over the long term;

☒ Develop habitat that complements the activities of the region's tribes, state and federal fish, wildlife, and water resource agencies, and private landowners; and

☒ Achieve a future condition that is self-sustaining after initial improvements have been completed.

6. DEVELOP AND IMPLEMENT AN ACTION PLAN FOR ACHIEVING THE GOALS

☒ **A.** The plan is consistent with tribal legal rights and tribal interests are addressed.

☐ **B**. The plan addresses any effects on minority or low-income populations if there are disproportionately high and adverse human health or environmental effects (Executive Order 12898, Environmental Justice).

N/A

☒ **C**. The plan addresses state and federal regulations for all activities in or near streams and wetlands, including (1) the Clean Water Act, Sections 401 and 404; (2) Protection of Wetlands, Executive Order 11990; (3) Floodplain Management, Executive Order 11988; and (4) Rivers and Harbors Act of 1879 (Section 10).

List applicable permits and status:

The SEPA process has been initiated on three of the four projects; Rockview (Final DNS received July 24, 2001), McKinney Mountain (DNS received on August 10, 2001) and Kumn Holloway (DNS received on August 10, 2001) . The USFWS is responsible for all permitting on the Foghorn project; it is unknown as to the current status.

☒ **D.** If the plan includes activities that may affect threatened and endangered species or their habitat and/or Essential Fish Habitat, work with BPA to consult with USFWS and/or NMFS in compliance with Section 7 of the ESA.

Consultation with USFWS and NMFS on ESA listed species and EFH to be handled by BPA (provide any additional details as known)

☐ **E**. *For projects involving the use of pesticides*, the plan uses only pesticides approved by the Environmental Protection Agency (EPA), and only in the manner specified by EPA.

Also, the plan prevents use of pesticides in or near surface water, unless it has been EPA-approved for such use.

N/A

☐ **F.** The plan addresses visual impacts by developing designs that screen streambank and habitat structures from sensitive viewing locations and that are in compliance with Wild, Scenic, or Recreational River management guidelines, as appropriate.

Reference:

N/A

☒ **G.** *If consultation with the SHPO and tribes, under Step 4, indicates a potential for cultural resources*, the plan incorporates surveys to document any cultural resources that may be present. If found, the plan incorporates a cultural resource management plan or other SHPO-approved actions where deemed necessary.

To be determined by BPA upon results of cultural resource survey.

Reference survey report:

Reference cultural resource management plan:

☐ **H.** The plan considers recreational opportunities suitable for physically disabled persons where existing access allows. The plan specifies that any new public-use facilities are free of barriers to persons with physical disabilities.

N/A

☐ **I.** *For forest lands*, the plan specifies a collective management agreement with federal and state landowners to implement actions outlined in the 1995 Federal Wildland Fire Management Policy and Program Review.

Reference:

N/A

☐ **J.** *For projects involving prescribed burns*, the plan addresses air quality impacts by obtaining required permits and following state-defined smoke management guidelines to determine allowable smoke qualities.

List applicable permits and status:

N/A

☒ **K.** The plan ensures that the project does not shift problems to another watershed or portion of a watershed.

☒ **L.** The plan assures quality control of project plans through technical reviews by qualified peers and appropriate agency personnel.

List reviewers:

BPA, Northwest Power Planning Council, and Independent Scientific Review Panel via the 2001 Action Plan for Fish in Response to Power System Emergency Solicitation of Proposals;

Okanogan County via the JARPA processes;

USFWS via Cooperative Agreement;

WDFW via the JARPA processes;

COE via the JARPA process;

WDOE via the JARPA process.

☒ **M.** The plan considers the full range of management techniques available, including adaptive management strategies, and uses the methods that best achieve the established aquatic habitat objectives in a cost-effective manner.

☒ **N.** The plan considers the results of similar projects, and consults the literature and other individuals doing similar types of projects to incorporate adaptive management strategies as the plan develops.

Reference other research/persons consulted:

See below.

Project Name Region/District	Type	Estimated Cost (000)	Construction Date
McKenzie (Entiat R) Reg. 2 / Dist. 7	Fish Screen	$40	Fall 1997 **Done**
McDonald Creek (Dungeness R) Reg. 6 / Dist. 16	Fish Screen	$35	Winter 1998 **Done**
Columbia Park Lagoon (Columbia R) Reg. 3 / Dist. 4	Fish Screen	$30	Spring 1998 **Done**
Hanan-Detwiler (Entiat R) Reg. 2 / Dist. 7	Fish Screen	$80	Spring 1998 **Done**
Younger (Yakima R) Reg. 3 / Dist. 8	Fish Screen	$38	Spring 1998 **Done**
Barclay (Methow R) Reg. 2 / Dist. 6	Fish Screen	$170	Summer 1998 **Done**

Project Name Region / District	Type	Estimated Cost (000)	Construction Date
Chewuch (Chewuch R) Reg. 2 / Dist. 6	Fish Screen	$200	Fall 1998 **Done**
Johncox (Ahtanum R) Reg. 3 / Dist. 8	Fish Screen	$95 BPA funded	Spring 1999 **Done**
Whitman Mission (Doan Cr) Reg. 1 / Dist. 3	Fish Screen Portable Rotary Wiper	$5	Spring 1999 **Done**
Larson Ditch (Libby Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Portable Rotary Wiper	$3	Summer 1999 **Done**
Buttermilk Ditch (Buttermilk Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Portable Paddle Wheel Drum	$35	Summer 1999 **Done**
Eight Mile Ditch (Chewuch R) Reg. 2 / Dist. 8 Okanogan County	Fish Screen Portable Paddle Wheel Drum	$ 18	Summer 1999 **Done**
Burlingame (Walla Walla R) Reg. 1 / Dist. 3 Walla Walla County	Fish Screen Replacement	$250 BPA funded	Fall 1999 **Done**
Wolf Creek (Wolf Cr) Reg. 2 / Dist. 6 Okanogan County	Custom Prefabricated Fish Screen	$100	Fall 1999 **Done**
Fulton (Chewuch R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$200	Spring 2000 **Done**
Twisp Power (Twisp R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$130	Spring 2000 **Done**
Moxee - Hubbard (Yakima R) Reg. 3 / Dist. 8 Yakima County	Fish Screen Replacement	$75 BPA funded	Spring 2000 **Done**

Project Name Region / District	Type	Estimated Cost (000)	Construction Date
Skyline Ditch (Chewuch R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$165	Fall 2000 **Done**
Early Winters (Early Winters Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$151	Spring 2001 **Done**

☐ **O.** The plan favors watershed management activities that have side benefits for wildlife, such as riparian habitat restoration.

List any applicable activities:

N / A

☒ **P.** The plan encourages the use of available local supplies and labor to accomplish project goals and objectives.

Describe:

Quality and attention to detail is extremely important in fish screen fabrication and installation. Fish screens are a specialty product and extremely tight tolerances are absolutely necessary to prevent juvenile fish from finding openings or gaps that would allow fish to get around the screen and consequently killed in the diversion. WDFW and BPA have been unable to assure consistent quality and reasonable cost where screen fabrication has been contracted to the private sector following government "low bid" procurement rules. WDFW can assure that screens meet our quality standards by performing critical fabrication phases, final assembly "in-house", and construction activities on site.

However, WDFW's quality requirements do not prevent contracting a significant portion of the fabrication activities and construction materials purchase to private vendors. Approximately 60 percent of the cost of producing a screening facility is expended on purchased materials and services from private contractors All shearing, punching, forming, sand blasting and painting operations are subcontracted. Local vendors are also used for the purchase of construction materials, such as lumber, concrete, gravel, miscellaneous hardware, etc. YSS currently fabricates and constructs fish screening facilities, other than pump screens, for BPA, State Capital Screen Replacement Program, and other federal, state, and local agencies.

☐ **Q.** The plan identifies opportunities for work skill training in conjunction with watershed management activities, such as encouraging construction contractors to use the local employment security office to hire staff for positions that involve on-the-job training.

List opportunities provided:

N / A

7. MONITOR CONDITIONS AND EVALUATE RESULTS

☒ **A.** Establish performance standards and monitor success in achieving the project goals outlined in
Step 5.

Common sense dictates that proper operation and maintenance of fish screen facilities, designed to protect all species and life stages of fish associated with them are an absolute must. Screening projects properly operated and maintained complement and enhance other investments in passage and habitat restoration and hatchery supplementation of wild stock by reducing injury and mortality of fish associated with these irrigation diversions.

Through proper and consistent O&M, these facilities provide "protection from mortality or injury to all species and life stages of Anadromous and resident salmonids associated with "irrigation diversions". The YSS performs routine and emergency maintenance on approximately 150 fish screening facilities throughout the state (BPA sites, service contracts, state O&M), including annual inspections and spring start-up inspections. Annual inspections look at the whole facility (i.e. structure, screens, drive systems, lifting system, etc.) and evaluate wear and/or failure of the various screen facility components. Spring start-up procedures address all of the failures or deficiencies found during annual inspections and ensure sites are set up to meet current state and federal screening criteria. Routine inspections are conducted on a weekly basis during the irrigation season to assist facility operators with maintenance or operational problems, perform routine maintenance, and to ensure facilities are operated per Design Operating Criteria. The YSS is also responsible for routine record keeping and contractor reimbursement.

☐ **B.** File as-implemented and 1-year monitoring reports with BPA's Watershed Management Program.

Date first report due:

N/A

8. ADAPT MANAGEMENT ACCORDING TO NEW INFORMATION

☒ **A.** Use information from monitoring to guide annual management priorities and activity planning.

Explain:

See **7.A.** above

☐ **B.** Consult the literature and obtain peer review during the development of adaptive management strategies.

Reference:

See **7.A.** above

MITIGATION MEASURES

Project managers are to incorporate in the project management plan the following resource-specific mitigation measures, as appropriate. Please check the mitigation measures you are

incorporating in your project. If they are not applicable, put N/A. If your response is not self-explanatory, please provide clarification.

SOILS

☒ **A.** Develop and implement an erosion control plan according to applicable Best Management Practices [USFS, Bureau of Land Management (BLM) or other] for each activity that involves disturbing soils (such as preparation of seedbeds or creation of wetlands).

See description under Item **C.** below.

☐ **B.** Where soil-disturbing activities are being considered, survey soil conditions to find and map potentially fragile soil types (such as those highly susceptible to erosion) and allow only those activities that would not disturb soils in these areas.

Reference:

☒ **C.** Monitor newly disturbed soils for evidence of erosion and implement active controls, such as plowing and seeding of new gullies (or temporary stabilization for later seeding during dry season).

Proper grading/sloping of excavated areas followed by stabilization with erosion control measures (e.g. erosion blanket, seeding, etc.) will be employed. Excavated areas that require stabilization will be covered with "coir fabric" or excelsior erosion blankets and re-seeded with a compatible grass mixture to get vegetation reestablished as quickly as possible. Up-rooted shrubs or small trees that are vigorous and send up new growth will be pruned back and replanted.

☐ **D.** *For projects involving prescribed burns*, conduct a pre-burn inventory to identify areas to avoid, including areas that may be vulnerable to increased erosion. Develop an approach to avoid these areas in accordance with the 1995 Federal Wildland Fire Management Policy and Program Review.

N/A

WATER AND FISH RESOURCES

☒ **A.** Select, implement, and enforce applicable Best Management Practices to protect water quality (such as those of the USFS or BLM) based on site-specific conditions, technical and economic feasibility, and the water quality standards for those waters potentially affected.

☒ **B.** Isolate in-stream construction from flow and remove fish above or below the construction site during construction. Coordinate in-channel projects with state, local, and/or tribal fisheries agencies and obtain necessary permits.

All construction activities will occur in the dry.

List applicable permits:

Substantial Development (Shoreline) Exemption.

Floodplain Permit Exemption.

Hydraulics Project Approval.

☒ **C.** Monitor water quality downstream from activities with potentially significant adverse affects on water quality, such as those land-disturbing activities occurring within 15 meters (50 feet) of the wetted perimeter of a stream or wetland. Implement corrective actions for conditions approaching maximum allowable degradation under state regulation.

See Item **B.** above.

☐ **D.** *For projects involving use of fertilizer*, minimize use of fertilizer and implement monitoring of downstream wetlands and streams to identify possible adverse affects. Stop application of fertilizer if signs of eutrophication are detected.

N/A

☐ **E.** *For projects involving wetland and/or island creation*, construct wetlands and islands during the dry season.

N/A

☐ **F.** *For projects involving wetland creation*, ensure adequate strategy to control nutrients excreted by large concentrations of waterfowl.

N/A

☐ **G.** Monitor dissolved oxygen levels in water released from deep impoundments and take actions to eliminate low-oxygen discharges, if found.

N/A

☐ **H.** Withdraw surface water or groundwater only where such withdrawal is necessary for the use and management of the property and is demonstrated not to cause significant adverse effects on aquatic life, riparian communities, or adjacent land use.

Reference:

N/A

☒ **I.** Develop water impoundments or diversions in consultation with state water agencies and state and tribal fish and wildlife agencies. Obtain U.S. Army Corps of Engineers and other applicable permits, where needed.

List permits needed:

Okanogan County Substantial Development Exemption

Okanogan County Floodplain Exemption

WDFW Hydraulic Project Approval

☐ **J.** Monitor groundwater quality under lands within the vicinity of the project area for projects that may contribute to groundwater contamination by herbicides, nutrients, petroleum hydrocarbons, and other soluble substances. Take corrective actions for conditions found to exceed state groundwater quality standards.

N/A

☐ **K.** Use hydraulic models for the design of in-stream structures to ensure that all stream-channel morphology variables are adequately addressed.

N/A

☐ **L.** Coordinate with state pollution control (water quality) agencies for projects involving the identification/assessment of a problem impacting water quality or post-implementation monitoring of project measures designed to improve water quality. Obtain existing water quality data and address compatibility of existing and any proposed monitoring data (e.g. format, quality control, etc.).

Name agency(s) you have coordinated with and status:

N/A

VEGETATION

☒ **A.** Acquire seeds and plants from stock grown under similar environmental conditions. Native stock is preferred; on-site native stock is ideal.

Excavated areas that require stabilization will be covered with “coir fabric” or excelsior erosion blankets and re-seeded with a compatible grass mixture to get vegetation reestablished as quickly as possible. Up-rooted shrubs or small trees that are vigorous and send up new growth will be pruned back and replanted.

☐ **B.** *For projects involving wetland creation or expansion*, survey for and avoid sensitive features during early planning.

N/A

☐ **C.** *For projects involving vegetation control*, develop a weed control plan with specific protocols for use of herbicides, mechanical, and biological methods, in consultation with local weed control officials. Protocols could be adapted from the USFS 1988 Final EIS for Managing Competing and Unwanted Vegetation.

Reference:

N/A

☐ **D.** *For projects involving vegetation control*, conduct weed control programs more efficiently and with a greater regional effect by using joint multi-agency planning.

N/A

WILDLIFE

☐ **A.** Before implementing any active management technique, identify sensitive wildlife habitats or features (such as eagle nests or mule deer winter range) and establish buffers and timing restrictions in consultation with state and/or tribal wildlife biologists.

N/A

☐ **B.** Restrict access, either seasonally or spatially, to protect sensitive wildlife areas, including recently planted, riparian, or nesting areas (such as heron colonies) and wildlife concentration areas (such as wintering areas for waterfowl or deer).

N/A

☐ **C.** Use interpretive signs and on-site custodian care to reduce adverse impacts of recreation on sensitive wildlife habitats.

N/A

☐ **D.** *For projects involving introduction, reintroduction, or augmentation of wildlife populations*, test animals for diseases before release.

N/A

☐ **E.** Coordinate wildlife control efforts with state wildlife agencies and with Animal Damage Control, U.S. Department of Agriculture, Animal and Plant Health Inspection Service. If threatened or endangered species are involved, coordinate with the USFWS.

N/A

☐ **F.** Avoid vegetation removal during the nesting season for birds. Where such removal is unavoidable, conduct nest surveys for sensitive bird species before disturbing lands.

N/A

☐ **G.** *For projects involving prescribed burns*, conduct inventories and establish fire breaks around riparian areas before conducting burns (unless riparian areas are expected to benefit from the treatment).

N/A

☒ **H.** Inventory vegetation in areas proposed for land-disturbing activities and avoid high-quality native vegetation communities (as defined by state or tribal agencies).

Plant surveys will be completed by BPA.

LAND AND SHORELINE USE

☐ **A.** *For projects involving land use changes*, meet with county land use officials and seek public input during early planning stages to develop the project in a manner consistent with local plans and values and to coordinate the efficient and effective use of multi-jurisdictional resources.

N/A

☐ **B.** Survey proposed alignments of water distribution systems to ensure that no rights-of-way or access routes are blocked.

N/A

☐ **C.** *For projects involving prescribed burns*, identify acceptable weather conditions and develop contingency plans in the event of fire escaping to adjacent lands.

N/A

ECONOMICS

☒ **A.** Encourage using local supplies and labor to accomplish project goals and objectives.

See **6. P.** above.

☒ **B.** Train and maintain a qualified work force to plan and implement various watershed restoration projects safely and effectively.

All of the projects identified in **6. N.** above were accomplished by personnel from the YSS, a unique group of talented trades people dedicated to the protection of fisheries resources in the state of Washington. This group includes journeyman welder/fabricators, plant mechanics, heavy equipment operators, trades helpers, and laborers.

☐ **C.** *For projects involving prescribed burns*, establish inter-local agreements with fire districts, the USFS, and other agencies to assist in controlled burn activities.

N/A

☒ **D.** Involve local and downstream water users and local water agencies to ensure that project water uses do not significantly affect productivity or production costs of water-dependent agriculture.

N/A

RECREATION/VISUAL

☐ **A.** Identify safe public recreational opportunities in conjunction with the project that do not jeopardize aquatic habitat objectives.

N/A

☐ **B**. Identify recreational opportunities suitable for physically disabled persons.

N/A

AIR QUALITY

☐ **A.** *For projects involving prescribed burns*, restrict prescribed fires to specific conditions, such as when (1) weather conditions and forecasts are favorable to a controlled burn, (2) air quality is sufficiently high to allow local smoke emissions, and (3) smoke dispersion conditions are favorable.

N/A

☐ **B.** *For projects involving prescribed burns*, use state-defined smoke management direction to determine allowable smoke quantities.

N/A

☐ **C.** *For projects involving the aerial application of herbicides*, develop specific protocols for use of herbicides, including protocols to protect air quality. Protocols could be adapted from the USFS 1988 Final EIS for Managing Competing and Unwanted Vegetation.

Reference:

N/A

OTHER PERTINENT INFORMATION

☒ **A.** The project does not include supplementation activities (e.g., building fish rearing ponds, providing for fish transportation, fish planting activities, or equipment to support planting activities).

ASSURANCES

☒ To the best of my knowledge, the project does not violate any applicable statutory, regulatory, or permit requirements for environment, safety, and health.

As a duly authorized representative of the grantee, I certify that the information provided above was duly researched, is true to the best of my knowledge, and is provided in good faith.

NAME

AUGUST 29, 2001
DATE

FISH SCREENING PROGRAM MANAGER
TITLE

NATIONAL ENVIRONMENTAL POLICY ACT COMPLIANCE CHECKLIST FOR WATERSHED MANAGEMENT PROJECTS

Bonneville Power Administration

3/22/02 revision

PROJECT NAME: Methow Basin Screening

BPA PROJECT NUMBER: 26015 LOCATION OF PROJECT: Various in Methow River Basin

GRANTEE: Organization: Washington Department of Fish and Wildlife

Primary Contact: Eric B. Egbers

Address: Yakima Screen Shop
3705 West Washington Avenue
Yakima, WA 98903-1137

Phone: (509) 575-2733

BRIEF DESCRIPTION OF PROJECT: This project provides fish screen facility upgrades on two Methow River Basin irrigation diversions – Foghorn and McKinney Mountain; and replaces the Rockview fish screen and diversion with a well.

Within the agency direct appropriation for the 99-01 biennium, funding was granted to fabricate and install replacement fish screens and associated facilities at the Foghorn, Rockview, McKinney Mountain, and Kumn Holloway irrigation diversions in the Methow River Basin. In January 2002, Washington Department of Fish and Wildlife (WDFW) decided to seek other non-BPA funding for the Kumn Holloway work, so that part of the proposal has since been excluded from this project and NEPA analysis. In March 2002, WDFW submitted a changed scope of work for the Rockview fish screen that proposes to drill a well and decommission the old fish screen rather than replace it. That change has been incorporated in this project and NEPA analysis.

The Foghorn fish screen is located about one mile west of Winthrop, WA on property owned by the U.S. Fish and Wildlife Service (USFWS), Winthrop Hatchery. The screen is operated by the Foghorn Irrigation Company and does not meet current National Marine Fisheries Service (NMFS) and WDFW criteria for fish protection including approach velocities, sweeping velocities, screen mesh, screen orientation, and bypass criteria. The WDFW Yakima Screen Shop (YSS) proposes a new electrically driven drum screen with proper orientation relative to flow, and new bypass system. All permitting and NEPA requirements for the Foghorn fish screen are the responsibility of the USFWS.

The Rockview fish screen is located about 8 miles northwest of Winthrop, WA on WDFW land in the Big Valley Unit Wildlife Area. The screen was built in 1965 and does not meet current NMFS and WDFW criteria for fish protection including approach velocities, sweeping velocities, screen orientation, and bypass criteria. The YSS proposes to drill a

well to irrigate their pasture/hayfield and to decommission the Rockview diversion, irrigation ditch and fish screen. The work would take two to four days to complete, and is scheduled for spring 2002.

The McKinney Mountain screen, built in the mid-1950's, is located about 10 miles northwest of Winthrop, WA. It also does not meet NMFS and WDFW criteria for fish protection including approach velocities, sweeping velocities, screen orientation, and bypass criteria. The YSS proposes to replace the old screen with a new paddlewheel driven, portable, modular drum screen with proper orientation relative to flow, and new bypass system in the spring 2002.

LIST THE TECHNIQUES OR ACTIONS, BY NUMBER AND TITLE, TO BE ADDRESSED BY THIS PROJECT (See Appendix A of the Watershed Management Program Environmental Impact Statement (EIS) available at *http://www.efw.bpa.gov/cgi-bin/PSA/NEPA/SUMMARIES/WatershedManagement_EIS0265*:

1.15 Fish Passage Enhancement - Fishways

4.20 Well Construction for Primary Water Source

4.23 Intake and Return Diversion Screens

4.25 Consolidate/Replace Irrigation Diversion Dams

9.23 Construction: Erosion and Sediment Control Structures

The following checklist provides documentation for compliance with the environmental requirements of the National Environmental Policy Act (NEPA) and other environmental laws and regulations. The checklist follows procedures established by the Watershed Management Program Final EIS and its corresponding Record of Decision (ROD) (at *http://www.efw.bpa.gov/cgi-bin/PSA/NEPA/SUMMARIES/WatershedManagement_EIS0265*). BPA staff will use this checklist to prepare the supplemental analysis required by the EIS and ROD.

BPA-funded projects must follow the eight-step planning process found in the ROD. (You may want to use the checklist during your planning process and complete it as you proceed to ensure your project follows the required steps.) Each planning step must be addressed in a Project Management Plan for your project. The Plan's scope and complexity will vary with the project's scope and complexity. The planning process should be interactive and flexible; the steps may occur out of sequence or simultaneously, and the results of one step may require you to re-evaluate earlier steps.

To check a box **on the checklist,** ***double click*** **on it—an options box will appear. Under "Default Value" choose "checked" then click OK.**

Please read the criteria, check them if they apply, and explain or reference how your project meets the criteria, or, explain why they do not apply to your project. Please sign and date the checklist when finished. Do NOT sign it electronically; we must have a hard copy with your signature. If you have questions or need help filling out this checklist, please contact Shannon Stewart, NEPA Watershed Project Coordinator, at 503-230-5928, e-mail scstewart@bpa.gov or Nancy Weintraub at 503-230-5373, e-mail nhweintraub@bpa.gov. BPA can assist you with surveys for cultural resources, threatened and endangered species, and hazardous wastes, although you may have to pay for contractor services, if needed, from your project funds.

EIGHT-STEP PLANNING PROCESS FOR WATERSHED MANAGEMENT PROJECTS

1. DEFINE THE AREA OF CONCERN / INTEREST

In completing this step, the project proponent(s) have considered the following:

☒ **A.** Protection of aquatic systems and other water uses.

If applicable, name agencies you have coordinated with and status:

Okanogan County, WDFW, USFWS, NMFS, U.S. Army Corps of Engineers (COE), Washington Department of Ecology (WDOE). WDFW has completed the SEPA process for the McKinney Mountain screen (Final DNS on August 31, 2001) and Rockview project (Final DNS on March 22, 2002 for the well & July 24, 2001 for the screen work), and the JARPA process has been initiated. The Foghorn project completed the NEPA process through USFWS on September 17, 2001, with BPA documenting categorical exclusion on December 12, 2001.

☒ **B**. The presence or absence of threatened or endangered species, as listed or proposed for listing under the Endangered Species Act (ESA), and their habitat and/or Essential Fish Habitat (EFH) within the vicinity of the project area. The U.S. Fish and Wildlife Service (USFWS) and National Marine Fisheries Services (NMFS) provide this information. Compile a list from the web sites below. Then e-mail, fax, or call the appropriate USFWS/NMFS office for their concurrence with your list. Include the date you retrieved information from the web sites to assure your use of the most current information.
USFWS: http://endangered.fws.gov/index.html
NMFS: http://www.nwr.noaa.gov/esalist.htm

In the Methow River Basin, Upper Columbia River spring chinook salmon and steelhead are listed as endangered and bull trout are listed as threatened under the Endangered Species Act of 1973 (ESA). The three irrigation diversions comprising this project are located in prime spawning, rearing and/or migration habitat used by these three species. The points of diversion are in locations that are currently or were historically accessible to chinook salmon. The conveyance channels leading to the screen sites provide rearing habitat for juvenile salmonids. There are no other ESA listed wildlife or plant species in the project area.

Substantial losses of juvenile fish are suspected at the existing screen facilities due to excessive approach velocities, over-sized screen mesh openings, and antiquated fish bypass systems. The proposed new facilities could significantly reduce mortality of fry, fingerlings, and smolts, thereby increasing productivity of listed fish stocks.

Contact made on (date) by (name):

USFWS Concurrence to McKinney Mtn BA: December 19, 2001, Mark Miller
USFWS Concurrence to Rockview BA: January 31, 2002, Stephen Lewis

NMFS Concurrence to Methow Fish Project BA: February 11, 2002, Steve Landino for D. Robert Lohn

Upper Columbia River Spring Chinook - Federal Register / Vol. 62, No. 159 / Monday, August 18, 1997

Upper Columbia River Steelhead - Federal Register / Vol. 64, No. 56 / Wednesday, March 24, 1999

Columbia River Bull Trout - Federal Register / Vol. 63, No. 111 / Wednesday, June 10, 1998

☐ **C.** The presence of hazardous and toxic wastes (for projects involving land acquisition and/or major ground disturbance).

Present?
Reference:

N/A

2. INVOLVE STAKEHOLDERS

☒ **A.** Consult with affected tribes, state and federal fish and wildlife agencies, cities, local governments, and nearby landowners.

The SEPA process is completed for Rockview and McKinney Mountain; JARPA has been initiated. The USFWS did the NEPA process for the Foghorn screen, with BPA adopting their process and conclusions via categorical exclusion in December 2001.

☒ **B.** Develop an effective public involvement program. Consider how to inform people about your project and solicit their comments, both early and throughout the planning process. Consider mailings, public notices, public meetings and workshops, Internet postings, radio advertisements, and stories or ads in the local newspaper and in BPA's monthly newsletter.

Describe program, list contacts made and/or methods of contact (i.e. newsletter, public meeting):

For McKinney Mountain and Rockview:

Per WAC 197-11-510 Public Notice, when SEPA requires notice to be given, the lead agency must use reasonable methods to inform the public and other agencies that an environmental document is being prepared or is available and that public hearing(s), if any, will be held. The agency may use its existing notice procedures.

Documents which are required to be sent to the WDOE under these SEPA rules will be published in the SEPA register, which will also constitute a form of public

notice. However, publication in the SEPA register shall not, in itself, meet compliance with this section.

Per WAC 220-100-095 Public Notice, when required under chapter 197-11 WAC, WDFW will give public notice by one or more of the following methods as appropriate for the specific circumstances:
(a) Notifying public and private groups and agencies with known interest in a certain proposal or in the type of proposals being considered;
(b) Notifying individuals with known interest in a certain proposal or in the type of proposal being considered;
(c) Publication in a newspaper of general circulation in the area in which the proposal will be implemented; and/or
(d) Posting the property.

For Foghorn:

USFWS was responsible for implementing NEPA process, including public involvement. By categorical exclusion of September 17, 2001, USFWS certifies that the spirit and intent of NEPA was met, so by categorical exclusion of December 12, 2001, BPA adopted USFWS findings.

☒ **C.** Where possible, form partnerships and plan cooperatively with government agencies and others to reduce costs, increase benefits, and/or eliminate duplication.

List partners:

BPA and WDFW partnered to complete the SEPA and NEPA processes for all projects. The USFWS is a funding partner with BPA on the Foghorn project. The USFWS and WDFW entered into a Cooperative Agreement as well for the Foghorn project that stipulates the obligations of each party.

USFWS – fund construction activities, review design and construction plans, and obtain necessary permits and BA's;
WDFW – develop design, fabricate metalwork, perform construction activities, and fund design and fabrication costs.

3. DEVELOP A STATEMENT OF DESIRED FUTURE CONDITION

☒ **A.** Identify a desired future condition for aquatic habitat in the project area, in cooperation with any other watershed activities, that responds to achieving established aquatic habitat objectives (See Step 5) and is self-sustaining (low-maintenance).

State-desired future condition:

Fish screening improvements provide significant immediate and long-term increases to

juvenile fish survival compared to obsolete screen technology. New fish screens comply with contemporary state and federal biological protection criteria to reduce direct mortality and indirect mortality (caused by stress and injury) to both anadromous and resident salmonids. New fish screens and bypass systems (with a life expectancy of 30-50 years, depending on maintenance), and/or replacing screens with wells thereby increasing instream flows will provide complete protection (virtually 100%) for all salmonid species and life stages. (Studies conducted in the Yakima Basin show that survival and guidance rates associated with fish movement through new fish screen facilities range from 95 to nearly 100 percent.)

☐ **B.** *For projects involving land acquisition,* consider developing sustainable resources (such as timber harvest or crop production) if consistent with established aquatic habitat objectives. These resources could be used to offset initial or long-term maintenance costs.

Describe if applicable:

N/A

4. CHARACTERIZE THE HISTORICAL AND PRESENT SITE CONDITIONS AND TRENDS

☒ **A.** Establish baseline information for aquatic habitat and species against which change can be measured (related to the "measurable aquatic habitat objective" standard included in Step 5).

Reference:

The Foghorn fish screen (circa 1950) does not meet current NMFS and WDFW criteria for fish protection including approach velocities, sweeping velocities, screen mesh, screen orientation, and bypass criteria. It sits in a channel ditch on land owned and operated by the Winthrop Fish Hatchery, USFWS.

The Rockview fish screen (circa 1965) does not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria. It sits in an irrigation ditch on land owned and operated by the WDFW. The proposed well site is within pasture/farm land owned by WDFW.

The McKinney Mountain screen (circa 1954) does not meet current NMFS and WDFW criteria for fish protection, including approach velocities, sweeping velocities, screen orientation, and bypass criteria. It sits in an irrigation ditch managed by McKinney Mountain Irrigation District in cooperation with WDFW.

☒ **B.** Consult with the State Historic Preservation Office (SHPO) and affected tribes to identify potential occurrences of cultural resources.

WDFW and USFWS reviewed their sites and records; BPA hired a consultant (Archeological and Historical Services) to conduct cultural resource field surveys and literature search. No cultural resources or eligible sites were found. A report has been sent to SHPO for concurrence to finding of no effect based on the surveys, the nature of the sites (already developed/farmed) and the nature of the work to be done (replace structures within original footprint; drill a well in historic pasture/farmland next to a road and an underground pipeline).

SHPO contacted on (date): March 8, 2002 – report mailed; verbal concurrence predicated on review of report.
Tribe(s) (list) contacted on (date): This project proposes no mitigable changes to use of resources, existing sites, or degree or type of activities that may affect undiscovered cultural resources, so formal consultation was not initiated. Recent discussions with tribes on minor fish habitat improvement projects of this type and the program in general have generated no concerns.

☒ **C.** Develop a plan to survey for threatened or endangered plant and animal species identified by the USFWS and/or NMFS as potentially occurring in the vicinity of the project area, before disturbing land or conducting other activities that may affect such species.

Describe:

BAs covering ESA plants and animals, including fish, were sent to USFWS and NMFS, and subsequently, concurrence with BPAs findings without stipulations or modifications was received.

- USFWS Concurrence to McKinney Mtn BA: December 19, 2001, Mark Miller
- USFWS Concurrence to Rockview BA: January 31, 2002, Stephen Lewis
- NMFS Concurrence to Methow Fish Project BA: February 11, 2002, Steve Landino for D. Robert Lohn

☒ **D.** Identify and map basic physical conditions such as soil conditions, topography, hydrology, vegetation, and biological information within the vicinity of the project area.

Reference information:

Salmon, Steelhead and Bull Trout Habitat Limiting Factors, Water Resource Inventory Area 48, Final Report, Washington State Conservation Commission,
Carmen Andonaegui, July 18, 2000

ESA plant species survey by Kimberly St Hilaire, BPA, November 2001

Washington Natural Heritage Program wildlife species habitat data base search, WDFW, November 2001

5. ESTABLISH PROJECT GOALS

☒ **A.** Establish measurable aquatic habitat and physical habitat objectives (e.g., compliance with existing state water quality standards, number of habitat units, list of indicator species).

B. Include these project goals, established by the Council:

☒ Protect and improve a variety of fish habitats, including spawning beds, overwintering and rearing areas, resting pools, and protective cover, especially high-quality native or other habitat for species of special concern (whether present at the project site or not), including endangered, threatened, or sensitive species;

New fish screen projects in irrigation diversions, and replacing diversions/screens with wells (thereby returning a portion of natural stream flows), provides significant immediate and long-term improvements to survival of anadromous and resident salmonid species in all life stages as well as other aquatic species. From a broader perspective, installing new fish screens and replacing certain diversions and screens with wells helps complement other investments in fish passage improvements and habitat restoration and hatchery supplementation to cumulatively improve wild fish stocks in the region.

☐ Develop riparian habitat that could benefit water quality, fish, and wildlife;

☒ Mitigate habitat losses in place, in kind, wherever possible;

☒ Protect and improve natural ecosystems and species diversity over the long term;

☒ Develop habitat that complements the activities of the region's tribes, state and federal fish, wildlife, and water resource agencies, and private landowners; and

☒ Achieve a future condition that is self-sustaining after initial improvements have been completed.

6. DEVELOP AND IMPLEMENT AN ACTION PLAN FOR ACHIEVING THE GOALS

☒ A. The plan is consistent with tribal legal rights and tribal interests are addressed.

☐ **B**. The plan addresses any effects on minority or low-income populations if there are disproportionately high and adverse human health or environmental effects (Executive Order 12898, Environmental Justice).

N/A

☒ **C**. The plan addresses state and federal regulations for all activities in or near streams and wetlands, including (1) the Clean Water Act, Sections 401 and 404; (2) Protection of Wetlands,

Executive Order 11990; (3) Floodplain Management, Executive Order 11988; and (4) Rivers and Harbors Act of 1879 (Section 10).

List applicable permits and status:

WDFW completed the SEPA process for Rockview (Final DNS on July 24, 2001 for the screen work; Final DNS on March 22, 2002 for the well) and McKinney Mountain (Final DNS on August 31, 2001). The USFWS did the NEPA process for the Foghorn screen, with BPA adopting their process and conclusions via categorical exclusion in December 2001.

☒ **D.** If the plan includes activities that may affect threatened and endangered species or their habitat and/or Essential Fish Habitat, work with BPA to consult with USFWS and/or NMFS in compliance with Section 7 of the ESA.

Consultation with USFWS and NMFS concluded in concurrence with BPA findings of may affect but likely to adversely affect.

☐ **E**. *For projects involving the use of pesticides*, the plan uses only pesticides approved by the Environmental Protection Agency (EPA), and only in the manner specified by EPA. Also, the plan prevents use of pesticides in or near surface water, unless it has been EPA-approved for such use.

N/A

☐ **F.** The plan addresses visual impacts by developing designs that screen streambank and habitat structures from sensitive viewing locations and that are in compliance with Wild, Scenic, or Recreational River management guidelines, as appropriate.

Reference:

N/A

☒ **G.** *If consultation with the SHPO and tribes, under Step 4, indicates a potential for cultural resources*, the plan incorporates surveys to document any cultural resources that may be present. If found, the plan incorporates a cultural resource management plan or other SHPO-approved actions where deemed necessary.

Reference report: Report of November 15, 2001, by Archeological and Historical Services
Reference cultural resource management plan: N/A

WDFW and USFWS reviewed their sites and records; BPA hired a consultant (Archeological and Historical Services) to conduct cultural resource field surveys and literature search. No cultural resources or eligible sites were found. A report has been sent to SHPO for concurrence to finding of no effect based on the surveys, the nature of the sites (already developed/farmed) and the nature of the work to be done (replace

structures within original footprint; drill a well in historic pasture/farmland next to a road and an underground pipeline).

☐ **H.** The plan considers recreational opportunities suitable for physically disabled persons where existing access allows. The plan specifies that any new public-use facilities are free of barriers to persons with physical disabilities.

N/A

☐ **I.** *For forest lands*, the plan specifies a collective management agreement with federal and state landowners to implement actions outlined in the 1995 Federal Wildland Fire Management Policy and Program Review.

Reference:

N/A

☐ **J.** *For projects involving prescribed burns*, the plan addresses air quality impacts by obtaining required permits and following state-defined smoke management guidelines to determine allowable smoke qualities.

List applicable permits and status:

N/A

☒ **K.** The plan ensures that the project does not shift problems to another watershed or portion of a watershed.

☒ **L.** The plan assures quality control of project plans through technical reviews by qualified peers and appropriate agency personnel.

List reviewers:

BPA, Northwest Power Planning Council, and Independent Scientific Review Panel via the 2001 Action Plan for Fish in Response to Power System Emergency Solicitation of Proposals;

Okanogan County via the SEPA and JARPA processes;

USFWS via Cooperative Agreement;

WDFW via the SEPA and JARPA processes;

COE via the JARPA process;

WDOE via the JARPA process.

☒ **M.** The plan considers the full range of management techniques available, including adaptive management strategies, and uses the methods that best achieve the established aquatic habitat objectives in a cost-effective manner.

☒ **N.** The plan considers the results of similar projects, and consults the literature and other individuals doing similar types of projects to incorporate adaptive management strategies as the plan develops.

Reference other research/persons consulted:

See below.

Project Name Region/District	Type	Estimated Cost (000)	Construction Date
McKenzie (Entiat R) Reg. 2 / Dist. 7	Fish Screen	$40	Fall 1997 **Done**
McDonald Creek (Dungeness R) Reg. 6 / Dist. 16	Fish Screen	$35	Winter 1998 **Done**
Columbia Park Lagoon (Columbia R) Reg. 3 / Dist. 4	Fish Screen	$30	Spring 1998 **Done**
Hanan-Detwiler (Entiat R) Reg. 2 / Dist. 7	Fish Screen	$80	Spring 1998 **Done**
Younger (Yakima R) Reg. 3 / Dist. 8	Fish Screen	$38	Spring 1998 **Done**
Barclay (Methow R) Reg. 2 / Dist. 6	Fish Screen	$170	Summer 1998 **Done**

Chewuch (Chewuch R) Reg. 2 / Dist. 6	Fish Screen	$200	Fall 1998 **Done**
Johncox (Ahtanum R) Reg. 3 / Dist. 8	Fish Screen	$95 BPA funded	Spring 1999 **Done**
Whitman Mission (Doan Cr) Reg. 1 / Dist. 3	Fish Screen Portable Rotary Wiper	$5	Spring 1999 **Done**
Larson Ditch (Libby Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Portable Rotary Wiper	$3	Summer 1999 **Done**

Buttermilk Ditch (Buttermilk Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Portable Paddle Wheel Drum	$35	Summer 1999 **Done**
Eight Mile Ditch (Chewuch R) Reg. 2 / Dist. 8 Okanogan County	Fish Screen Portable Paddle Wheel Drum	$ 18	Summer 1999 **Done**
Burlingame (Walla Walla R) Reg. 1 / Dist. 3 Walla Walla County	Fish Screen Replacement	$250 BPA funded	Fall 1999 **Done**
Wolf Creek (Wolf Cr) Reg. 2 / Dist. 6 Okanogan County	Custom Prefabricated Fish Screen	$100	Fall 1999 **Done**
Fulton (Chewuch R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$200	Spring 2000 **Done**
Twisp Power (Twisp R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$130	Spring 2000 **Done**
Moxee - Hubbard (Yakima R) Reg. 3 / Dist. 8 Yakima County	Fish Screen Replacement	$75 BPA funded	Spring 2000 **Done**
Skyline Ditch (Chewuch R) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$165	Fall 2000 **Done**
Early Winters (Early Winters Cr) Reg. 2 / Dist. 6 Okanogan County	Fish Screen Replacement	$151	Spring 2001 **Done**

☐ **O.** The plan favors watershed management activities that have side benefits for wildlife, such as riparian habitat restoration.

List any applicable activities:

N/A

☒ **P.** The plan encourages the use of available local supplies and labor to accomplish project goals and objectives.

Describe:

Quality and attention to detail is extremely important in fish screen fabrication and installation. Extremely tight tolerances prevent juvenile fish from finding openings or gaps that would allow them to get around the screen and subsequently trapped in the diversion. WDFW and BPA have been unable to get consistent quality and reasonable cost when screen fabrication has been contracted to private companies following government "low bid" procurement rules. However, the Yakima Screen Shop (YSS) of WDFW can assure that screens meet required quality standards by doing critical fabrication, assembly and installation phases using their own personnel, designs and equipment. Still, about 60 percent of a typical YSS screen project funds goes to materials and services from private contractors (e.g. metal shearing, punching, forming, sand blasting and painting operations are subcontracted; materials, such as lumber, concrete, gravel, miscellaneous hardware, etc., are purchased from local vendors).

Local labor and equipment would be used to drill the Rockview well.

☐ **Q.** The plan identifies opportunities for work skill training in conjunction with watershed management activities, such as encouraging construction contractors to use the local employment security office to hire staff for positions that involve on-the-job training.

List opportunities provided:

N/A

7. MONITOR CONDITIONS AND EVALUATE RESULTS

☒ **A.** Establish performance standards and monitor success in achieving the project goals outlined in Step 5.

Proper operation and diligent maintenance of fish screens is essential for reducing injury of fish and mortality in irrigation diversions.

The YSS inspects and does routine and emergency maintenance on about 150 fish screening facilities throughout Washington. Annual inspections assess the entire facility (i.e. structure, screens, drive systems, lifting system, etc.) and evaluate the condition and repair or replacement needs of the various screen facility components. Spring start-up procedure remedies any deficiencies found during annual inspections and ensures sites are updated to meet current state and federal screening criteria. Weekly inspections during the irrigation season occur to check that facilities are operated per Design Operating

Criteria and to assist operators with maintenance or other needs.

☐ **B.** File as-implemented and 1-year monitoring reports with BPA's Watershed Management Program.

Date first report due:

N/A

8. ADAPT MANAGEMENT ACCORDING TO NEW INFORMATION

☒ **A.** Use information from monitoring to guide annual management priorities and activity planning.

Explain:

See **7. A.** above.

☐ **B.** Consult the literature and obtain peer review during the development of adaptive management strategies.

Reference:

N/A

MITIGATION MEASURES

Project managers are to incorporate in the project management plan the following resource-specific mitigation measures, as appropriate. Please check the mitigation measures you are incorporating in your project. If they are not applicable, put N/A. If your response is not self-explanatory, please provide clarification.

SOILS

☒ **A.** Develop and implement an erosion control plan according to applicable Best Management Practices [USFS, Bureau of Land Management (BLM) or other] for each activity that involves disturbing soils (such as preparation of seedbeds or creation of wetlands).

See Item C. below.

☐ **B.** Where soil-disturbing activities are being considered, survey soil conditions to find and map potentially fragile soil types (such as those highly susceptible to erosion) and allow only those activities that would not disturb soils in these areas.

Reference:

N/A

☒ **C.** Monitor newly disturbed soils for evidence of erosion and implement active controls, such as plowing and seeding of new gullies (or temporary stabilization for later seeding during dry season).

Proper grading/sloping of excavated areas followed by stabilization with erosion control measures (e.g. erosion blanket, seeding, etc.) will be employed. Excavated areas that

require stabilization will be covered with “coir fabric” or excelsior erosion blankets and re-seeded with a compatible seed mixture to get vegetation reestablished as quickly as possible. Up-rooted shrubs or small trees that appear vigorous and likely to reestablish would be pruned and replanted.

☐ **D.** *For projects involving prescribed burns*, conduct a pre-burn inventory to identify areas to avoid, including areas that may be vulnerable to increased erosion. Develop an approach to avoid these areas in accordance with the 1995 Federal Wildland Fire Management Policy and Program Review.

N/A

WATER AND FISH RESOURCES

☒ **A.** Select, implement, and enforce applicable Best Management Practices to protect water quality (such as those of the USFS or BLM) based on site-specific conditions, technical and economic feasibility, and the water quality standards for those waters potentially affected.

☒ **B.** Isolate in-stream construction from flow and remove fish above or below the construction site during construction. Coordinate in-channel projects with state, local, and/or tribal fisheries agencies and obtain necessary permits.

All construction activities would occur in the dry irrigation channel.

List applicable permits:

Substantial Development (Shoreline) Exemption

Floodplain Permit Exemption

Hydraulics Project Approval

☒ **C.** Monitor water quality downstream from activities with potentially significant adverse affects on water quality, such as those land-disturbing activities occurring within 15 meters (50 feet) of the wetted perimeter of a stream or wetland. Implement corrective actions for conditions approaching maximum allowable degradation under state regulation.

See Item B. above; and Soils Item C.

☐ **D.** *For projects involving use of fertilizer*, minimize use of fertilizer and implement monitoring of downstream wetlands and streams to identify possible adverse affects. Stop application of fertilizer if signs of eutrophication are detected.

N/A

☐ **E.** *For projects involving wetland and/or island creation*, construct wetlands and islands during the dry season.

N/A

☐ **F.** *For projects involving wetland creation*, ensure adequate strategy to control nutrients excreted by large concentrations of waterfowl.

N/A

☐ **G.** Monitor dissolved oxygen levels in water released from deep impoundments and take actions to eliminate low-oxygen discharges, if found.

N/A

☐ **H.** Withdraw surface water or groundwater only where such withdrawal is necessary for the use and management of the property and is demonstrated not to cause significant adverse effects on aquatic life, riparian communities, or adjacent land use.

Reference:

Rockview well would take ground water. WDFW has applied for conversion of water right from surface flow through the Rockview diversion to ground water. Decommissioning Rockview diversion would boost water availability and flow in the Methow River.

☒ **I.** Develop water impoundments or diversions in consultation with state water agencies and state and tribal fish and wildlife agencies. Obtain U.S. Army Corps of Engineers and other applicable permits, where needed.

List permits needed:

Okanogan County Substantial Development Exemption

Okanogan County Floodplain Permit Exemption

WDFW Hydraulic Project Approval

☐ **J.** Monitor groundwater quality under lands within the vicinity of the project area for projects that may contribute to groundwater contamination by herbicides, nutrients, petroleum hydrocarbons, and other soluble substances. Take corrective actions for conditions found to exceed state groundwater quality standards.

N/A

☐ **K.** Use hydraulic models for the design of in-stream structures to ensure that all stream-channel morphology variables are adequately addressed.

N/A

☐ **L.** Coordinate with state pollution control (water quality) agencies for projects involving the identification/assessment of a problem impacting water quality or post-implementation monitoring of project measures designed to improve water quality. Obtain existing water quality data and address compatibility of existing and any proposed monitoring data (e.g. format, quality control, etc.).

Name agency(s) you have coordinated with and status:

N/A

VEGETATION

☒ **A.** Acquire seeds and plants from stock grown under similar environmental conditions. Native stock is preferred; on-site native stock is ideal.

Excavated areas that require stabilization would be covered with “coir fabric” or excelsior erosion blankets and re-seeded with a compatible seed mixture to get vegetation reestablished as quickly as possible. Up-rooted shrubs or small trees that are vigorous and likely to reestablish would be pruned and replanted.

☐ **B.** *For projects involving wetland creation or expansion*, survey for and avoid sensitive features during early planning.

N/A

☐ **C.** *For projects involving vegetation control*, develop a weed control plan with specific protocols for use of herbicides, mechanical, and biological methods, in consultation with local weed control officials. Protocols could be adapted from the USFS 1988 Final EIS for Managing Competing and Unwanted Vegetation.

Reference:

N/A

☐ **D.** *For projects involving vegetation control*, conduct weed control programs more efficiently and with a greater regional effect by using joint multi-agency planning.

N/A

WILDLIFE

☐ **A.** Before implementing any active management technique, identify sensitive wildlife habitats or features (such as eagle nests or mule deer winter range) and establish buffers and timing restrictions in consultation with state and/or tribal wildlife biologists.

N/A

☐ **B.** Restrict access, either seasonally or spatially, to protect sensitive wildlife areas, including recently planted, riparian, or nesting areas (such as heron colonies) and wildlife concentration areas (such as wintering areas for waterfowl or deer).

N/A

☐ **C.** Use interpretive signs and on-site custodian care to reduce adverse impacts of recreation on sensitive wildlife habitats.

N/A

☐ **D.** *For projects involving introduction, reintroduction, or augmentation of wildlife populations*, test animals for diseases before release.

N/A

☐ **E.** Coordinate wildlife control efforts with state wildlife agencies and with Animal Damage Control, U.S. Department of Agriculture, Animal and Plant Health Inspection Service. If threatened or endangered species are involved, coordinate with the USFWS.

N/A

☐ **F.** Avoid vegetation removal during the nesting season for birds. Where such removal is unavoidable, conduct nest surveys for sensitive bird species before disturbing lands.

N/A

☐ **G.** *For projects involving prescribed burns*, conduct inventories and establish fire breaks around riparian areas before conducting burns (unless riparian areas are expected to benefit from the treatment).

N/A

☒ **H.** Inventory vegetation in areas proposed for land-disturbing activities and avoid high-quality native vegetation communities (as defined by state or tribal agencies).

N/A

LAND AND SHORELINE USE

☐ **A.** *For projects involving land use changes*, meet with county land use officials and seek public input during early planning stages to develop the project in a manner consistent with local plans and values and to coordinate the efficient and effective use of multi-jurisdictional resources.

N/A

☐ **B.** Survey proposed alignments of water distribution systems to ensure that no rights-of-way or access routes are blocked.

N/A

☐ **C.** *For projects involving prescribed burns*, identify acceptable weather conditions and develop contingency plans in the event of fire escaping to adjacent lands.

N/A

ECONOMICS

☒ **A.** Encourage using local supplies and labor to accomplish project goals and objectives.

See 6. P. above.

☒ **B.** Train and maintain a qualified work force to plan and implement various watershed restoration projects safely and effectively.

Most of the projects identified in 6. N. above were accomplished by the YSS, a unique group of talented people dedicated to the protection of fish and their habitat in Washington.

☐ **C.** *For projects involving prescribed burns*, establish inter-local agreements with fire districts, the USFS, and other agencies to assist in controlled burn activities.

N/A

☐ **D.** Involve local and downstream water users and local water agencies to ensure that project water uses do not significantly affect productivity or production costs of water-dependent agriculture

N/A

RECREATION/VISUAL

☐ **A.** Identify safe public recreational opportunities in conjunction with the project that do not jeopardize aquatic habitat objectives.

N/A

☐ **B**. Identify recreational opportunities suitable for physically disabled persons.

N/A

AIR QUALITY

☐ **A.** *For projects involving prescribed burns*, restrict prescribed fires to specific conditions, such as when (1) weather conditions and forecasts are favorable to a controlled burn, (2) air quality is sufficiently high to allow local smoke emissions, and (3) smoke dispersion conditions are favorable.

N/A

☐ **B.** *For projects involving prescribed burns*, use state-defined smoke management direction to determine allowable smoke quantities.

N/A

☐ **C.** *For projects involving the aerial application of herbicides*, develop specific protocols for use of herbicides, including protocols to protect air quality. Protocols could be adapted from the USFS 1988 Final EIS for Managing Competing and Unwanted Vegetation.

Reference:

N/A

OTHER PERTINENT INFORMATION

☒ **A.** The project does not include supplementation activities (e.g., building fish rearing ponds, providing for fish transportation, fish planting activities, or equipment to support planting activities).

ASSURANCES

☒ To the best of my knowledge, the project does not violate any applicable statutory, regulatory, or permit requirements for environment, safety, and health.

As a duly authorized representative of the grantee, I certify that the information provided above was duly researched, is true to the best of my knowledge, and is provided in good faith.

/s/ Mickey A. Carter 3/25/02

NAME DATE

Environmental Protection Specialist, BPA
TITLE

The information in this checklist is compiled from information contained in BPA's administrative record for this project including SEPA checklists, Final Determinations of Nonsignificance, JARPA applications, original project proposal, original NEPA checklist signed by WDFW YSS Fish Screening Program Lead Eric Egbers, and other documents.